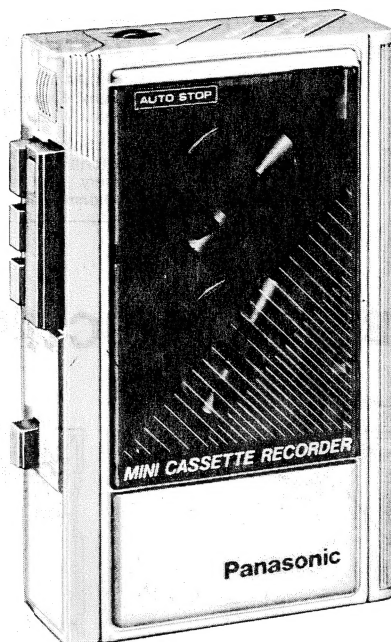


Service Manual

AC/Battery Mini Cassette Recorder
with Auto-Stop and One-Touch Recording

Mini Cassette
RQ-340
(Silver)



This is the Service Manual
for the following areas.

M ... For U.S.A.

C ... For Canada.

RQ-339 MECHANISM SERIES

■ SPECIFICATIONS

Power requirement:	AC; 120V, 60 Hz (with optional Panasonic AC Adaptor RP-63) Battery; 6V (four "AA" size batteries) Car battery; (with optional Panasonic Car Adaptor RP-698)
Motor:	Mechanism governor motor
Power output:	700mW
Tape speed:	4.8cm/s
Track system:	2-track monaural recording and playback
Jacks:	DC in; 6V ϕ 5.5 Monitor; 8 Ω ϕ 3.5
Speaker:	5cm PM dynamic speaker (6 Ω)
Dimensions:	100.5(W) \times 160.5(H) \times 46.5(D)mm (3 ¹⁵ / ₁₆ \times 6 ⁵ / ₁₆ \times 1 ⁷ / ₈)"
Weight:	450g, without batteries

Design and specifications are subject to change without notice.

Panasonic®

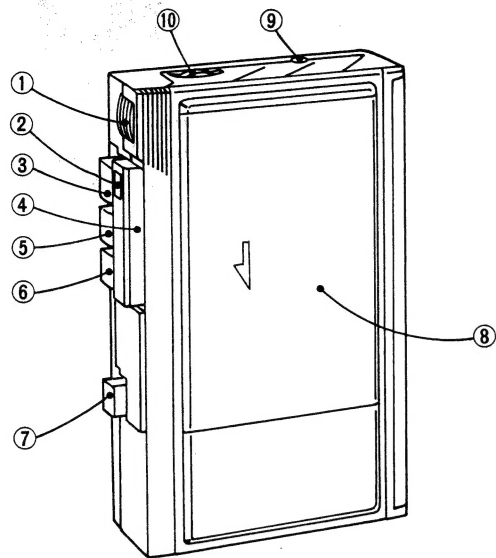
Matsushita Engineering and
Service Company
50 Meadowland Parkway,
Secaucus, New Jersey 07094

Panasonic Hawaii Inc.
91-238 Kauhū St. Ewa Beach
P.O. Box 774
Honolulu, Hawaii 96808-0774

Matsushita Electric
of Canada Limited
5770 Ambler Drive, Mississauga,
Ontario, L4W 2T3

Panasonic Sales Company,
Division of Matsushita Electric
of Puerto Rico, Inc.
Ave. 65 De Infanteria, KM 9.7
Victoria Industrial Park
Carolina, Puerto Rico 00630

LOCATION OF CONTROLS AND COMPONENTS



- ① Built-in Microphone
- ② Record Button
- ③ Stop Button
- ④ Play Button
- ⑤ Rewind/Review Button
- ⑥ Fast Forward/Cue Button
- ⑦ Eject/Pause Button
- ⑧ Cassette Compartment
- ⑨ Monitor Jack (M3 φ3.5)
- ⑩ Volume Control

BATTERY SERVICE LIFE

UM-3 (AA-size) Batteries
Approx. 4 hours of recording (EIAJ)
Approx. 4 hours of playback (EIAJ) with volume set at center position
The above battery service life is measured according to the conditions set forth by EIAJ (Electronic Industries Association of Japan). As the battery service life varies with the method of operation and environmental conditions, use these values as reference.

DISASSEMBLY INSTRUCTIONS

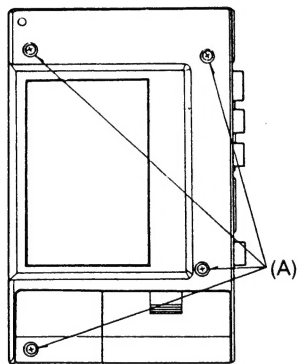


Fig. 1

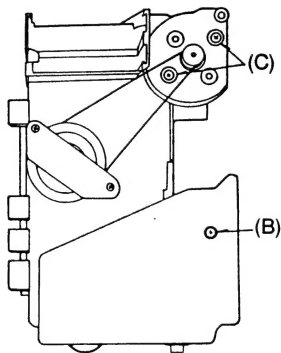


Fig. 2

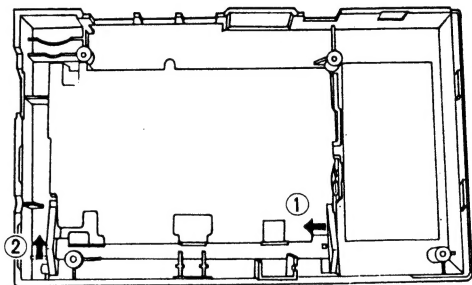


Fig. 3

Ref. No.	Shown in Fig. —.	To Remove	Remove
1	1	Rear Cabinet	Screw (2.6×33mm)(A)×4
2	2	Circuit Board	Screw (2.6×8mm)(B)×1
3	2	Motor	Screw (2.6×7.5mm)(C)×2
4	3	Cassette Compartment	Push the catch in the direction of arrows ① ②.

MEASUREMENTS AND ADJUSTMENTS

■ ALIGNMENT INSTRUCTION

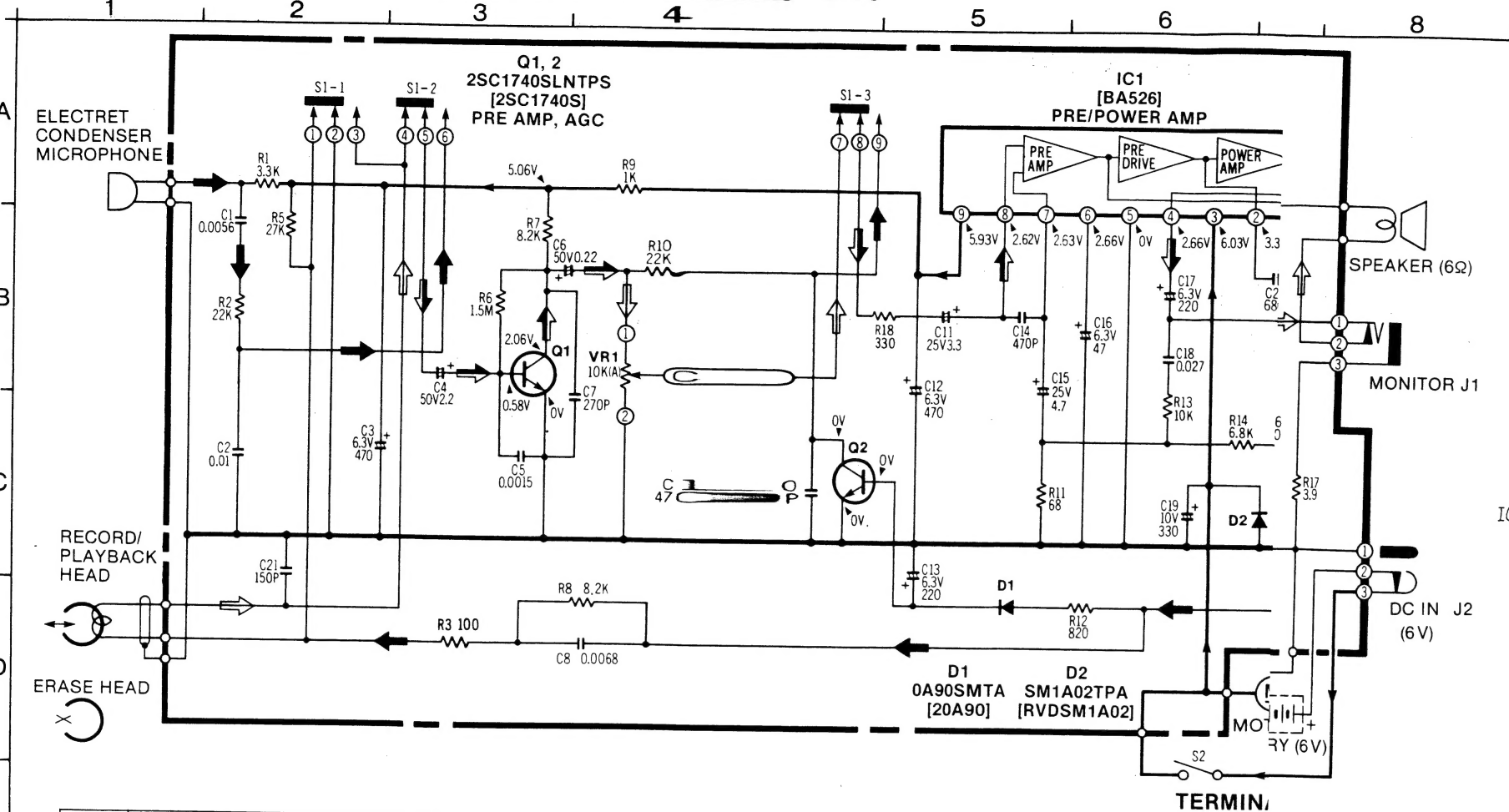
READ CAREFULLY BEFORE ATTEMPTING ALIGNMENT

1. Make sure heads are clean.
2. Make sure capstan and pressure roller are clean.
3. Judgeable room temperature: 20±5°C (68±9°F)
4. Set volume control to maximum.
5. Set power source voltage to 6V DC.

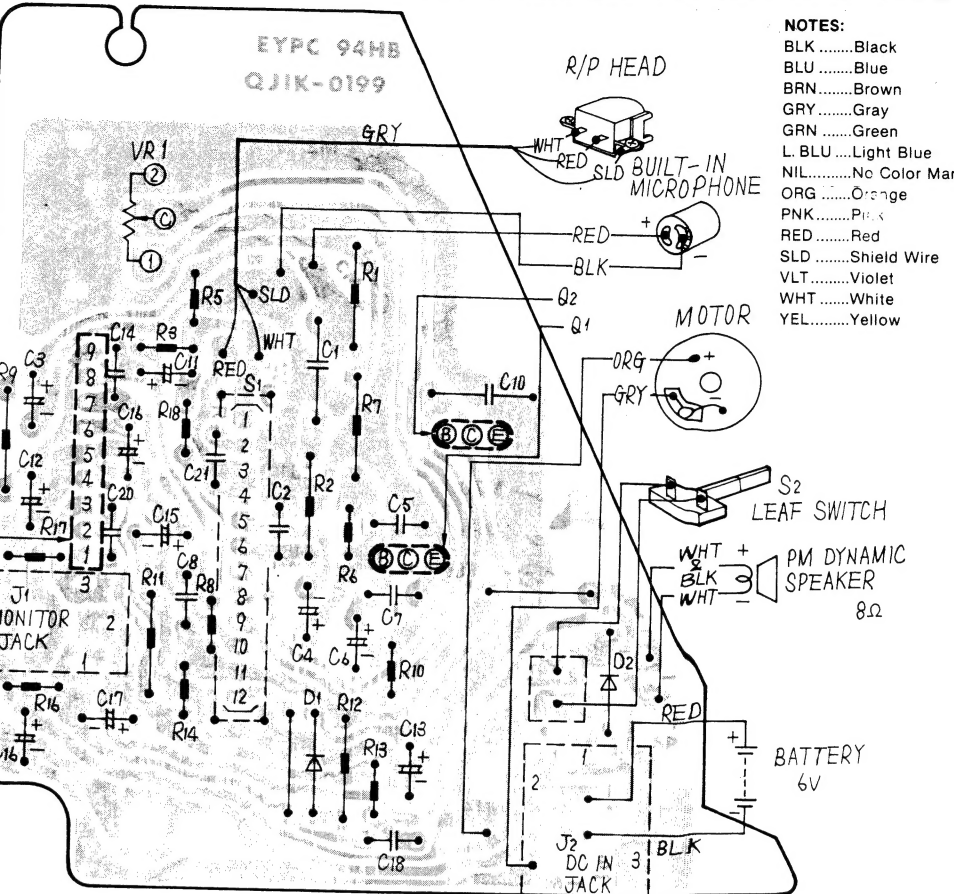
■ ADJUSTMENT

ITEM	INPUT	MEASUREMENT POINT	SPECIFICATION	ADJUSTMENT POINT	REMARKS
Head azimuth	QZZCFM (8 kHz, -20dB)	Monitor jack (8Ω)	Maximum output	Head adjustment screw	Playback mode

SCHEMATIC DIAGRAM MODEL RQ-340



CIRCUIT BOARD AND WIRING CONNECTION DIAGRAM MODEL RQ-340



- NOTES:
- BLKBlack
 - BLUBlue
 - BRNBrown
 - GRYGray
 - GRNGreen
 - L. BLULight Blue
 - NILNo Color Mark
 - ORGOrange
 - PNKPink
 - REDRed
 - SLDShield Wire
 - VLViolet
 - WHTWhite
 - YELYellow

- NOTES:
- The circuit shown in on the conductor in indicates printed circuit on the back side of the printed circuit board.
 - The circuit board diagram may be modified at any time with the development of new technology.

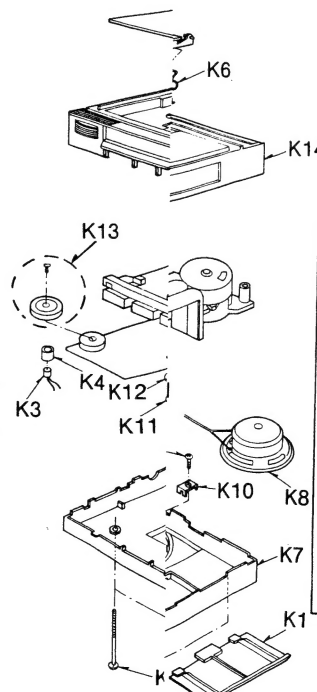
Ref. No.	Part No.	Part Name & Description
INTEGRATED CIRCUIT		
IC 1	BA526	IC (Pre/Power Amp)
TRANSISTORS		
Q 1, 2	2SC1740S	Transistor (Pre/AGC Amp)
DIODES		
D 1	20A90	Diode (Ge)
D 2	RVDSM1A02	Diode (Si)
VARIABLE RESISTOR		
VR 1	EVJ56AT12A14	Volume Control VR.
SWITCHES		
S 1	QSS4217	Slide Switch
S 2	QSB0294	Leaf Switch (Power ON/OFF)
JACKS		
J 1	QJA0172	Jack (Monitor)
J 2	QJA0149	Jack (DC In)

Ref. No.	Part No.	Part Name & Description	Ref. No.	Part No.	Part Name & Description
CAPACITORS			RESISTORS		
C 1	ECB	A1E562NX	R 1	ERD25FJ332	
C 2	RCB	S1C103NY	R 2	ERD25TJ223	
C 3, 12	ECB	A0JU471	R 3	ERD16TJ101	
C 4	ECB	A1HU2R2	R 5	ERD16TJ273	
C 5	RCB	S1C152NX	R 6	ERD16TJ155	
C 6	ECB	A1HUR22	R 7	ERD25FJ822	
C 7	RCB	S1H271KB	R 8	ERD16TJ822	
C 8	ECB	A1E682NX	R 9	ERD25FJ102	
C 10	ECB	A1H471KB	R 10	ERD16TJ223	
C 11	ECB	A1EU3R3	R 11	ERD25FJ680	
C 13, 17	ECB	A0JU221	R 12	ERD25FJ821	
C 14	RCB	S1H471KB	R 13	ERD16TJ103	
C 15	ECB	A1EU4R7	R 14	ERD16TJ682	
C 16	ECB	A0JU470	R 16	ERD16TJ421	
C 18	ECB	D273MXY	R 17	ERD16TJ3R9	
C 19	ECB	A1AU331	R 18	ERD16TJ331	
C 20	RCB	S1H681KB			
C 21	RCB	S1H151KB			

- NOTES:
- S1-1—S1-4Record/playback switch (shown in playback position).
 - S2.....Power ON/OFF switch (shown in OFF position).
 - VR1.....Volume control.
 - Resistance are ohms (Ω), 1/4 watt unless specified otherwise. 1K=1,000 Ω , 1M=1,000K Ω .
 - Capacity are in microfarads (μ F) unless specified otherwise. P=Pico-farads.
 - All voltage values shown in circuitry are under no signal condition and playback mode with volume control at minimum position. For measurement, use VTVM.
 - () this arrow indicates the flow of the playback signal.
 - () this arrow indicates the flow of the recording signal.
 - () this arrow indicates the flow of the playback and recording signal in combination.
 - () + B (bias) line.
 - () Earth line.

- Described in the schematic diagram are two types of numbers; this supply part number and production number for transistors and diodes. One type of number is used for supply parts number and production parts number when they are identical.
- e.g. Q1
 2SC1740SLNTPS — Production parts number
 (2SC1740S) — Supply parts number
 D1
 0A90AMTA — Production parts number
 (20A90) — Supply parts number
- The supply parts number is described alone in the replacement parts list.
- This schematic diagram may be modified at any time with the development of new technology.

C.T PARTS LOCATION

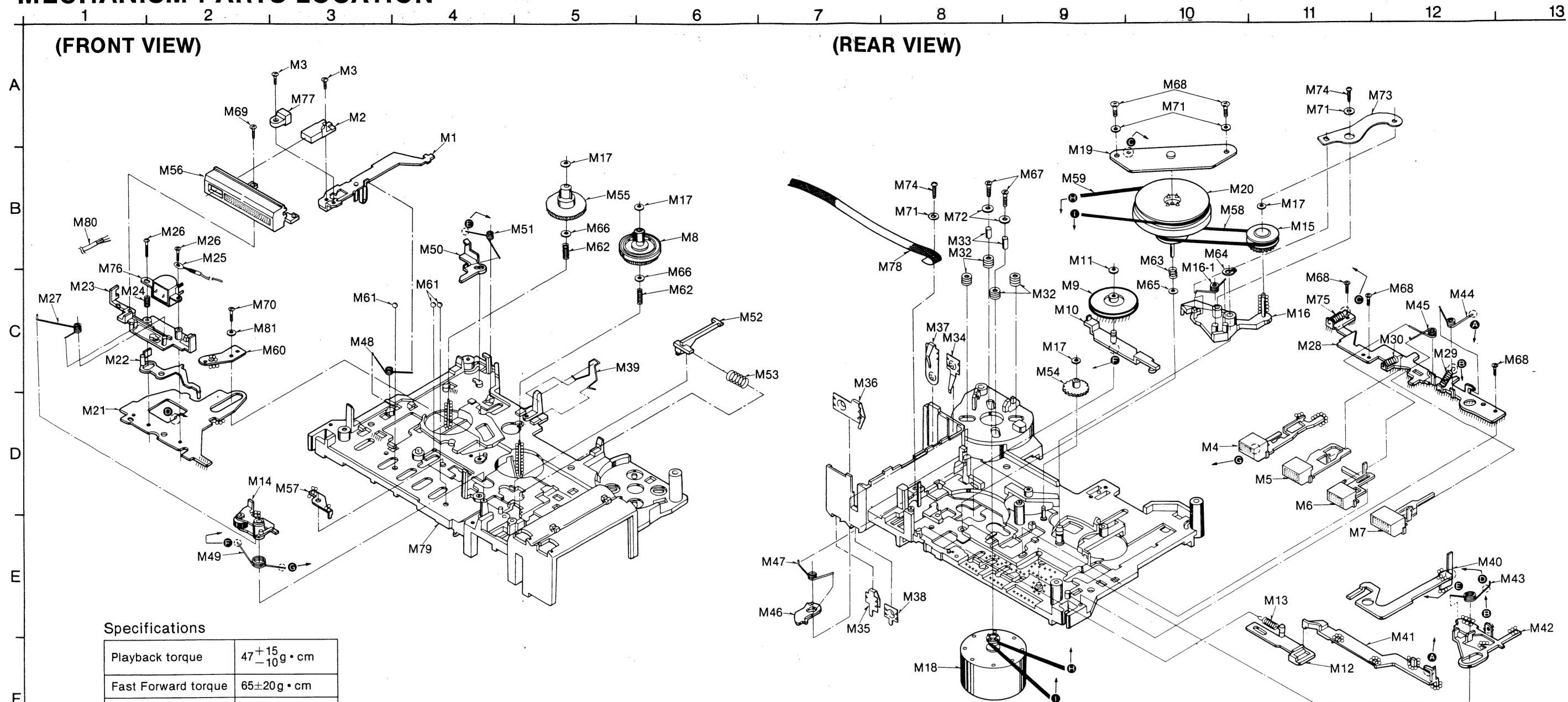


Ref. No.	Part No.	Part Name & Description
CABINET PARTS		
K 1	QKFK0318	Battery Cover Assembly
K 2	XTN26 + 33G	Screw Φ 2.6 x 33
K 3	WM034CZ102	Microphone
K 4	QBG1616	Mic Rubber
K 5	QKFK0118	Cassette Compartment
K 6	RUS629Z	Spring, Cassette Compartment
K 7	QKMK0245	Rear Cabinet
K 8	QSP5P01S	Speaker
K 9	XTN26 + 6G	Screw Φ 2.6 x 6
K 10	QXA53903	Speaker Holding Metal
K 11	XTN26 + 8B	Screw Φ 2.6 x 8
K 12	XWG26	Washer Φ 2.6
K 13	QGT1560K	Knob (Volume Control)
K 14	QKMK0253	Front Cabinet

ACCESSORIES AND PACKING MATERIALS

Ref. No.	Part No.	Part Name & Description
ACCESSORIES		
A 1 [M]	RQX4547Z	Instruction Book [For U.S.A.]
A 1 [C]	RQX4583Z	Instruction Book [For Canada.]
PACKINGS		
P 1 [M]	QPNK131Z	Inner Carton [For U.S.A.]
P 1 [C]	QPNK132Z	Inner Carton [For Canada.]
P 2	QPAK114Z	Cushion
P 3	QPSK114Z	Pad
P 4	XZB21X20A01	Polyethylene Cover

MECHANISM PARTS LOCATION



Specifications

Playback torque	$47^{+15}_{-10} \text{ g} \cdot \text{cm}$
Fast Forward torque	$65 \pm 20 \text{ g} \cdot \text{cm}$
Rewind torque	$65 \pm 20 \text{ g} \cdot \text{cm}$
Pressure of pressure roller	$360 \pm 60 \text{ gcm}$
Wow and flutter	0.4% (WRMS)

REPLACEMENT PARTS LIST

Ref. No.	Part No.	Part Name & Description	Ref. No.	Part No.	Part Name & Description	Ref. No.	Part No.	Part Name & Description	Ref. No.	Part No.	Part Name & Description	Ref. No.	Part No.	Part Name & Description	Ref. No.	Part No.	Part Name & Description
MECHANICAL PARTS			M 12	QMR1978	Auto-Stop Driving Rod	M 25	QJT0039	Lug Terminal	M 41	QMR1979	Lock Rod	M 56	QGO2067	Playback Button	M 70	XTN26 + 8BFZ	Tapping Screw $\Phi 2.6 \times 8$
M 1	QXR1000	Record Rod Assembly	M 13	QBT1940	Auto-Stop Driving Rod Spring	M 26	XSB2D10.5	Screw $\Phi 2 \times 10.5$	M 42	QMR1972	Playback Rod	M 57	QML3848	Review Lever	M 71	XWG26	Washer 2.6 ϕ
M 2	QGO1953	Record Button	M 14	QXL1502	Pinch Roller Assembly	M 27	QBN1842	Pressure Roller Spring	M 43	QBN1838	Playback Rod Spring (A)	M 58	QDB0309	Fast Wind Belt	M 72	XWA26B	Washer 2.6 ϕ
M 3	XTN26 + 5B	Tapping Screw $\Phi 2.6 \times 5$	M 15	QXG1061	Fast Wind Pulley Assembly	M 28	QMF2217	Rod Holding Plate	M 44	QBN1840	Lock Rod Spring	M 59	QDB0308	Flywheel Belt	M 73	QMF2231	Frame Holding Plate
M 4	QXR0828	Eject/Pause Button Assembly	M 16	QXL1503	Fast Wind Frame Assembly	M 29	QBT1941	Playback Rod Spring (B)	M 45	QBN1836	Stop Rod Spring	M 60	QBP1940	Head Base Plate Pressure Spring	M 74	XTN26 + 6B	Tapping Screw $\Phi 2.6 \times 6$
M 5	QXR0829	Fast Forward/Cue Button Assembly	M 16-1	QBN1837	Fast Wind Frame Spring	M 30	QBT1942	Fast Forward Spring	M 46	QML3854	Pause Lock Lever	M 61	QDK1012	Steel Ball 2.5 ϕ	M 75	QBT1902	Earth Spring
M 6	QXR0830	Rewind/Review Button Assembly	M 17	QBW2008	Snap Washer	M 32	QBG1420	Motor Cushion	M 47	QBN1835	Pause Lock Lever Spring	M 62	QBC1272K	Back Tension Spring	M 76	QWY0141Y	Record/Playback Head
M 7	QXR0831	Stop Button Assembly	M 18	QXU0384	Motor Assembly	M 33	QMC0079	Motor Collar	M 48	QBN1841	Record Rod Spring	M 63	QBC1359	Flywheel Spring	M 77	QWY2149	Erase Head
M 8	QXD0131	Takeup Reel Table Assembly	M 19	QXH0379	Flywheel Holding Plate Assembly	M 34	QJB0166	Battery Terminal (A) $\oplus \ominus$	M 49	QBN1844	Idler Spring	M 64	XUBQ4FT	Stop Ring 4 ϕ	M 78	QBJK0062	Battery String
M 9	QXI0119	Idler Assembly	M 20	QXF0184	Flywheel Assembly	M 35	QJB0158	Battery Terminal (B) \ominus	M 50	QML3847	Erase Safety Lever	M 65	QBW0043	Snap Washer	M 79	QXKK1003	Chassis Assembly
M 10	QML3849	Idler Lever	M 21	QMK1944	Head Base Plate	M 36	QJB0168	Battery Terminal (C) $\oplus \ominus$	M 51	QBN1839	Leaf Switch Rod Spring	M 66	QBW0042	Washer	M 80	QLSK2LJNC464	Shield Wire
M 11	QBW2046	Snap Washer	M 22	QML3852	Auto-Stop Detection Lever	M 37	QJB0159	Battery Terminal (D) $\oplus \ominus$	M 52	QML3853	Cassette-up Lever	M 67	XYN26 + B7.5	Screw $\Phi 2.6 \times 7.5$			
			M 23	QMZ1282	Head Spacer	M 38	QJB0167	Battery Terminal (E) \oplus	M 53	QBC1396	Cassette-up Lever Spring	M 68	XTN26 + 8B	Tapping Screw $\Phi 2.6 \times 8$			
			M 24	QBC1298	Head Spring	M 39	QBN1843	Cassette Retainer Spring	M 54	QDG1252	Fast Wind Gear	M 69	XSB2D10	Screw $\Phi 2 \times 10$			
						M 40	QMR2221	Switch Rod	M 55	QDR1157	Takeup Reel Table						

NOTES:

When changing mechanism parts, apply the specified grease to the area marked show in the drawing "Mechanism Parts Location"

- "x" mark.....Rocol paste (Lubricating grease) (RZZ0L06)
- "O" mark.....Molytone (Lubricating grease) (RZZ0L07)
- "Δ" mark.....Dynamic (Lubricating grease) (RZZ0L05)
- "///" mark (Oblique Lines).....Aero (Lubricating grease) (RZZ0L04)